REMARKS / ARGUMENTS

I. General Remarks and Disposition of the Claims

Please consider the application in view of the following remarks. Applicants thank the Examiner for the careful consideration of this application. including the references that Applicants have submitted in this case.

At the time of the Final Office Action, claims 18-32 and 34-77 were pending in this application. Of these, claims 20-24, 27, 30, 37-41, 44, 47, 50-64 and 67 were indicated as withdrawn. Claims 18, 19, 25, 26, 28, 29, 31, 32, 35, 36, 42, 43, 45, 46, 48, 49, 65, 66, and 68-77 were rejected in the Office Action. By this paper, claims 18, 35, 50, and 68 have been amended, claims 30, 47, 62 have been canceled. These amendments are supported by the specification as filed. All the amendments are made in a good faith effort to advance the prosecution on the merits of this case. It should not be assumed that the amendments made herein were made for reasons related to patentability. Applicants respectfully request that the above amendments be entered and further request reconsideration in light of the amendments and remarks contained herein.

II. Remarks Regarding Rejections Under 35 U.S.C. § 103(a)

A. Rejection of Claims 35, 36, 42, 45, 48, 49, 68-70 and 72-75 under 35 U.S.C. § 103(a) over *Nguyen* in view of *Beck* and *Sielcken*

Claims 35, 36, 42, 45, 48, 49, 68-70 and 72-75 stand rejected under 35 U.S.C. § 103(a) as being unpatentable over U.S. Patent No. 5,381,864 to Nguyen et al. (hereinafter "*Nguyen*") in view of U.S. Patent No. 4,493,875 to Beck et al. (hereinafter "*Beck*"), and in further view of U.S. Patent No. 5,585,524 to Sielcken et al. (hereinafter "*Sielcken*"). Applicants respectfully disagree.

In order for a reference or combination of references to form the basis for a rejection under § 103(a), a *prima facie* case of obviousness must be established. Obviousness is determined by construing the scope of the prior art, identifying the differences between the claims and the prior art, determining the level of skill in the pertinent art at the time of the invention, and considering objective evidence present in the application indicating obviousness or nonobviousness. *Graham v. John Deere,* 383

U.S. 1, 17 (1966). The United States Supreme court has identified a number of rationales under which a *prima facie* case of obviousness may be established. See *KSR International Co.* v. *Telellex. Inc.,* 550 U.S. 398, 127 S.Ct. 1727, 1731 (2007). Each rationale is directed towards identifying known elements in the prior art. *See* MPEP § 2143. Applicants respectfully submit that due to the differences between the claims as currently amended and the cited references, the Examiner has not established a *prima facie* case of obviousness, in that the combination of *Nguyen*, *Beck* and *Sielcken* does not establish that each limitation of the present claim was known in the prior art. In particular, the combination of *Nguyen*, *Beck*, and *Sielcken* fails to teach or suggest "at least one density reducing material, wherein the density reducing material is a solid material with a size that is greater than about half the size of the coated particulate and has a specific gravity less than the coated particulate," and "allowing the density reducing material to adhere to a surface of the coated particulate to create at least one reduced-density, coated particulate" as recited by independent claims 35 and 68.

In contrast, *Nguyen* discloses the use of a particulate blend consisting of a large particulate material and a small particulate material. *Nguyen* does not discuss a difference in densities between the particulates, or that any particles adhere to each other. Further, a stream of resin coated particles within a fluid would not result in the reduced-density coated particulate as required by claims 35 and 68. In particular, the prior art teaches that a hard, consolidated mass will not form until the resin is allowed to harden. *See Nguyen* at col. 2, ll. 34-47. Thus, individual particles will not adhere to one another in a carrier fluid until the resin hardens. As taught by *Nguyen*, this occurs once the coated particulates are placed into the formation. *See Nguyen* Col. 3, ll. 35-46.

The Examiner has stated that "obviously, glass beads added to the stream comprising resin coated particles would adhere to resin because Nguyen et al '864 teaches that the epoxy resin rapidly coats glass beads in the stream." Office Action mailed 1/14/2009 at 5. Under this reasoning, any particulate that can be coated with resin would adhere to any other particulate coated with resin. Such a conglomerate would form a solid mass that would not stop with the formation of particulates adhered together as required by the present invention. Nor would the particles necessarily form

a reduced-density, coated particulate as the individual core particulates would be just as likely to combine as any reduced density particulates. Further, the resulting solid mass would interfere with transportation of the particles into the subterranean formation. As discussed above, individual particles will not adhere to one another in a carrier fluid until the resin hardens. Thus, the fact that resin would coat a glass bead does not indicate that the glass bead would adhere to another particle to form the reduced-density, coated particulate as required by claims 35 and 68.

Beck does not make up for the deficiencies of *Nguyen*. *Beck* specifically limits the coating particle to a void-containing particle with a thickness from about 5 to 20% of the average diameter of the core. *See Beck* at col. 1, ll. 67-68, col. 2, ll. 45-48. Thus *Beck* at least does not disclose "at least one density reducing material, wherein the density reducing material is a solid material with a size that is greater than about half the size of the coated particulate" as required by independent claims 35 and 68. Nor does Beck disclose "allowing the density reducing material to adhere to a surface of the coated particulate to create at least one reduced-density, coated particulate" for a density reducing material meeting the requirements of independent claims 35 and 68..

Moreover, the method of *Nguyen* cannot be combined with *Beck* without rendering the methods of *Nguyen* unsatisfactory for its intended purpose since the method of mixing taught in *Nguyen* would not result in the formation of the coated particle of *Beck*. Specifically, the particles are combined in a carrier fluid in *Nguyen* and only form a hardened mass once the resin hardens, which can be once the particulates are in the formation. This procedure would not result in the coating of small particulates to a large core as in *Beck*, which occurs without a carrier fluid.

Furthermore, *Sielcken* does not make up for the deficiencies of either *Nguyen* or *Beck*. The Examiner relies on *Sielcken* for the alleged teaching "that a continuous process can be carried out using a stirred tank reactor (CSTR), a tubular reactor, a non-stirred bubble column and an internal or external gas-lift loop reactor . . . ." Final Office Action mailed June 5, 2009 (hereinafter "*6-5-2009 Final Office Action*") at 3. Thus, *Sielcken* is not relied on to disclose "at least one density reducing material, wherein the density reducing material is a solid material with a size that is greater than about half the size of the coated particulate and has a specific gravity less than the coated

particulate," or "allowing the density reducing material to adhere to a surface of the coated particulate to create at least one reduced-density, coated particulate" as recited by independent claims 35 and 68.

Therefore, Applicants respectfully assert that independent claims 35 and 68 are not rendered obvious by the combination of *Nguyen* in view of *Beck* and in further view of *Sielcken*. Claims 36, 42, 45, 48, 49, 69, 70, and 72-75 depend, either directly or indirectly, from independent claims 35 and 68 and therefore include all the limitations of those independent claims. Thus, claims 36, 42, 45, 48, 49, 69, 70, and 72-75 are patentable over the combination of *Nguyen* in view of *Beck* and in further view of *Sielcken* for at least the reasons cited above in regard to claims 35 and 68. *See* 35 U.S.C. § 112 4 (2004). Accordingly, for at least these reasons, Applicants respectfully request withdrawal of this rejection with respect to claims 35, 36, 42, 45, 48, 49, 68-70 and 72-75.

B. Rejection of Claims 43 and 74 under 35 U.S.C. § 103(a) over *Nguyen* in view of *Beck, Sielcken*, and *Murphey '988*

Claims 43 and 74 stand rejected under 35 U.S.C. § 103(a) as being unpatentable over *Nguyen* in view of *Beck*, further in view of *Sielcken*, and further in view of U.S. Patent No. 4,665,988 to Murphey et al. (hereinafter "*Murphey '988*"). In order for a reference or combination of references to form the basis for a *prima facie* rejection under § 103(a), the reference or combination of references must establish that every limitation of the claim was known in the prior art. As discussed above in Section II.A., the combination of *Nguyen*, *Beck*, and *Sielcken* fails to teach or suggest "at least one density reducing material, wherein the density reducing material is a solid material with a size that is greater than about half the size of the coated particulate and has a specific gravity less than the coated particulate," and "allowing the density reducing material to adhere to a surface of the coated particulate to create at least one reduced-density, coated particulate" as recited by independent claims 35 and 68.

Murphey '988 fails to render obvious that which *Nguyen*, *Beck*, and *Sielcken* lack. Rather, the Final Office Action merely relies on *Murphey '988* for its alleged teaching of "the use of ethylene glycol butyl ether . . . as a solvent for dissolving epoxy resins . . . such as bisphenol A-epichlorohydrin . . . ." Office Action mailed January 14,

2009 (hereinafter "*1-14-2009 Office Action*") at 7. As such, *Murphey '988* fails to teach or suggest "at least one density reducing material, wherein the density reducing material is a solid material with a size that is greater than about half the size of the coated particulate and has a specific gravity less than the coated particulate," and "allowing the density reducing material to adhere to a surface of the coated particulate to create at least one reduced-density, coated particulate" as recited by independent claims 35 and 68.

Claims 43 and 74 depend indirectly and directly, from independent claims 35 and 68, respectively, and therefore include all of the limitations of those independent claim. Thus, claims 43 and 74 are patentable over the combination of *Nguyen*, *Beck*, *Sielcken*, and *Murphey '988*. See 35 U.S.C. § 112 ¶ 4. Accordingly, for at least these reasons, Appellant respectfully requests that the rejection of claims 43 and 74 be withdrawn.

C. Rejection of Claims 45-46 and 75-76 under 35 U.S.C. § 103(a) over *Nguyen* in view of *Beck, Sielcken*, and *McDaniel*

Claims 45-46 and 75-76 stand rejected under 35 U.S.C. § 103(a) as being unpatentable over *Nguyen* in view of *Beck*, further in view of *Sielcken*, and further in view of U.S. Publication No. 2002/0048676 to McDaniel *et al.* (hereinafter "*McDaniel*"). In order for a reference or combination of references to form the basis for a *prima facie* rejection under § 103(a), the reference or combination of references must establish that every limitation of the claim was known in the prior art. As discussed above in Section II.A., the combination of *Nguyen*, *Beck*, and *Sielcken* fails to teach or suggest "at least one density reducing material, wherein the density reducing material is a solid material with a size that is greater than about half the size of the coated particulate and has a specific gravity less than the coated particulate," and "allowing the density reducing material to adhere to a surface of the coated particulate to create at least one reduced-density, coated particulate" as recited by independent claims 35 and 68.

McDaniel fails to render obvious that which *Nguyen*, *Beck*, and *Sielcken* lack. Rather, the Final Office Action merely relies on *McDaniel* for its alleged teaching of "a liquid resole phenol/formaldehyde resin . . . or glycidyl either or epoxies such as bisphenol A-epichlorohydrin resin . . . or a polyester resin . . . or a natural resin . . . [that] can be used for binding particles together. In other words, the resins are functionally

equivalent." *1-14-2009 Office Action* at 7. As such, *McDaniel* fails to teach or suggest "at least one density reducing material, wherein the density reducing material is a solid material with a size that is greater than about half the size of the coated particulate and has a specific gravity less than the coated particulate," and "allowing the density reducing material to adhere to a surface of the coated particulate to create at least one reduced-density, coated particulate" as recited by independent claims 35 and 68.

Claims 45-46 and 75-76 depend, directly or indirectly, from independent claims 35 and 68 and therefore include all of the limitations of those independent claim. Thus, claims 45-46 and 75-76 are patentable over the combination of *Nguyen*, *Beck*, *Sielcken*, and *McDaniel*. *See* 35 U.S.C. § 112 ¶ 4. Accordingly, for at least these reasons, Appellant respectfully requests that the rejection of claims 45-46 and 75-76 be withdrawn.

D. Rejection of Claims 18, 19, 25, 28, 31, 32, 65, 66, 71, and 77 under 35 U.S.C. § 103(a) over *Nguyen* in view of *Beck, Sielcken*, and *Martin*

Claims 18, 19, 25, 28, 31, 32, 65, 66, 71, and 77 stand rejected under 35 U.S.C. § 103(a) as being unpatentable over *Nguyen* in view of *Beck*, further in view of *Sielcken*, and further in view of U.S. Patent No. 4,969,523 to Martin *et al.* (hereinafter "*Martin*"). In order for a reference or combination of references to form the basis for a *prima facie* rejection under § 103(a), the reference or combination of references must establish that every limitation of the claim was known in the prior art. As discussed above in Section II.A., the combination of *Nguyen*, *Beck*, and *Sielcken* fails to teach or suggest "at least one density reducing material, wherein the density reducing material is a solid material with a size that is greater than about half the size of the coated particulate and has a specific gravity less than the coated particulate," and "allowing the density reducing material to adhere to a surface of the coated particulate to create at least one reduced-density, coated particulate" as recited by independent claims 35 and 68. The same limitations are present in independent claim 18, and the arguments applicable to *Nguyen*, *Beck*, and *Sielcken* in Section II.A above are applicable to independent claim 18 as well.

Martin fails to render obvious that which *Nguyen*, *Beck*, and *Sielcken* lack. Rather, the Final Office Action merely relies on *Martin* for its alleged teaching of "a

combination of first and second particles having a density within the range of about 0.7 to about 4.0 . . ., wherein first particles has a density selected from the lower portion of the density range such as sand . . . may be used in a servicing fluid for gravel packing of subterranean well." *1-14-2009 Office Action* at 8. *Martin* does not teach a coated particulate or any coating techniques. As such, *Martin* fails to teach or suggest "at least one density reducing material, wherein the density reducing material is a solid material with a size that is greater than about half the size of the coated particulate and has a specific gravity less than the coated particulate," and "allowing the density reducing material to adhere to a surface of the coated particulate to create at least one reduced-density, coated particulate" as recited by independent claims 18, 35, and 68.

In addition, the teachings of *Nguyen* and *Martin* cannot be combined with the teachings of *Beck* without rendering the method of *Nguyen* unsatisfactory for its intended purpose. As discussed above in Section II.A, the method of *Nguyen* cannot be combined with *Beck* without rendering the methods of *Nguyen* unsatisfactory for its intended purpose since the method of mixing taught in *Nguyen* would not result in the formation of the coated particle of *Beck*. Nothing in *Martin* resolves the issues associated with the differences in mixing between *Nguyen* and *Beck*. Specifically, *Martin* only addresses the use of particulates of varying densities and does not disclose any type of consolidating agent, coating of the particulates, or adhering one particle to another. As such, *Martin* does not resolve the issues with the combination of *Nguyen* and *Beck* and therefore *Nguyen*, *Beck*, and *Martin* cannot be combined.

Claims 19, 25, 28, 31, 32, 65, 66, 71, and 77 depend, directly or indirectly, from independent claims 18, 35, and 68 and therefore include all of the limitations of those independent claim. Thus, claims 18, 19, 25, 28, 31, 32, 65, 66, 71, and 77 are patentable over the combination of *Nguyen*, *Beck*, *Sielcken*, and *Martin*. *See* 35 U.S.C. § 112 ¶ 4. Accordingly, for at least these reasons, Appellant respectfully requests that the rejection of claims 18, 19, 25, 28, 31, 32, 65, 66, 71, and 77 be withdrawn.

E. Rejection of Claim 2 6 Under 35 U.S.C. § 103(a) over *Nguyen* in view of *Beck, Sielcken, Martin*, and *Murphey '988*

Claim 26 stands rejected under 35 U.S.C. § 103(a) as being unpatentable over *Nguyen* in view of *Beck*, further in view of *Sielcken*, further in view of *Martin*, and further

in view of *Murphey '988*. In order for a reference or combination of references to form the basis for a *prima facie* rejection under § 103(a), the reference or combination of references must establish that every limitation of the claim was known in the prior art. As discussed above in Section II.D, the combination of *Nguyen*, *Beck*, *Sielcken*, and *Martin* fails to teach or suggest "at least one density reducing material, wherein the density reducing material is a solid material with a size that is greater than about half the size of the coated particulate and has a specific gravity less than the coated particulate," and "allowing the density reducing material to adhere to a surface of the coated particulate to create at least one reduced-density, coated particulate" as recited by independent claim 18.

Murphey '988 fails to render obvious that which *Nguyen*, *Beck*, *Sielcken*, and *Martin* lack. Rather, the Final Office Action merely relies on *Murphey '988* for its alleged teaching of "the use of ethylene glycol butyl ether . . . as a solvent for dissolving epoxy resins . . . such as bisphenol A-epichlorohydrin . . . ." *1-14-2009 Office Action* at 9. As such, *Murphey '988* fails to teach or suggest "at least one density reducing material, wherein the density reducing material is a solid material with a size that is greater than about half the size of the coated particulate and has a specific gravity less than the coated particulate," and "allowing the density reducing material to adhere to a surface of the coated particulate to create at least one reduced-density, coated particulate" as recited by independent claim 18.

Claim 26 depends, indirectly, from independent claim 18 and therefore includes all of the limitations of that independent claim. Thus, claim 26 is patentable over the combination of *Nguyen*, *Beck*, *Sielcken*, *Martin*, and *Murphey '988*. *See* 35 U.S.C. § 112 ¶ 4. Accordingly, for at least these reasons, Appellant respectfully requests that the rejection of claim 26 be withdrawn.

F. Rejection of Claims 28-29 Under 35 U.S.C. § 103(a) over *Nguyen* in view of *Beck, Sielcken, Martin,* and *McDaniel*

Claims 28-29 stand rejected under 35 U.S.C. § 103(a) as being unpatentable over *Nguyen* in view of *Beck*, further in view of *Sielcken*, further in view of *Martin*, and further in view of *McDaniel*. In order for a reference or combination of references to form the basis for a *prima facie* rejection under § 103(a), the reference or combination

of references must establish that every limitation of the claim was known in the prior art. As discussed above in Section II.D, the combination of *Nguyen*, *Beck*, *Sielcken*, and *Martin* fails to teach or suggest "at least one density reducing material, wherein the density reducing material is a solid material with a size that is greater than about half the size of the coated particulate and has a specific gravity less than the coated particulate," and "allowing the density reducing material to adhere to a surface of the coated particulate to create at least one reduced-density, coated particulate" as recited by independent claim 18.

McDaniel fails to render obvious that which *Nguyen*, *Beck*, *Sielcken*, and *Martin* lack. Rather, the Final Office Action merely relies on *McDaniel* for its alleged teaching of "a liquid resole phenol/formaldehyde resin . . . or glycidyl either or epoxies such as bisphenol A-epichlorohydrin resin . . . or a polyester resin . . . or a natural resin . . . can be used for binding particles together. In other words, the resins are functionally equivalent." *1-14-2009 Office Action* at 9. As such, *McDaniel* fails to teach or suggest "at least one density reducing material, wherein the density reducing material is a solid material with a size that is greater than about half the size of the coated particulate and has a specific gravity less than the coated particulate," and "allowing the density reducing material to adhere to a surface of the coated particulate to create at least one reduced-density, coated particulate" as recited by independent claim 18.

Claims 28-29 depend, directly or indirectly, from independent claim 18 and therefore include all of the limitations of that independent claim. Thus, claims 28-29 are patentable over the combination of *Nguyen*, *Beck*, *Sielcken*, *Martin*, and *McDaniel*. *See* 35 U.S.C. § 112 ¶ 4. Accordingly, for at least these reasons, Appellant respectfully requests that the rejection of claims 28-29 be withdrawn.

G. Rejection of Claims 35, 36, 42, 45, 46, 48, 49, 68-70, 72, 73, 75 and 76 under 35 U.S.C. § 103(a) over *Murphey '390* in view of *McDaniel* and *Sielcken*

Claims 35, 36, 42, 45, 46, 48, 49, 68-70, 72, 73, 75 and 76 stand rejected under 35 U.S.C. § 103(a) as being unpatentable over U.S. Patent No. 5,128,390 to Murphey et al. (hereinafter "*Murphey '390*") in view of *McDaniel*, further in view of *Sielcken*. In order for a reference or combination of references to form the basis for a *prima facie*

rejection under § 103(a), the reference or combination of references must establish that every limitation of the claim was known in the prior art. The combination of *Murphey '390*, *McDaniel*,, and *Sielcken* fails to teach or suggest "at least one density reducing material, wherein the density reducing material is a solid material with a size that is greater than about half the size of the coated particulate and has a specific gravity less than the coated particulate," and "allowing the density reducing material to adhere to a surface of the coated particulate to create at least one reduced-density, coated particulate" as recited by independent claims 35 and 68.

The Examiner admits that *Murphey '390* fails to disclose a density reducing material. *See 1-14-2009 Office Action* at 11. Moreover, as discussed above in Section II.A, the disclosure of a resin coated particulate does not teach or disclose that the particulates would adhere within a treatment fluid. Rather, the particulates will not adhere to one another in a carrier fluid until the resin hardens. As taught by *Murphey '390*, this occurs once the coated particulates are placed into the formation. *See e.g.*, *Murphey '390*, Col. 2, ll. 44-48. As such, *Murphey '390* fails to teach or disclose "at least one density reducing material, wherein the density reducing material is a solid material with a size that is greater than about half the size of the coated particulate and has a specific gravity less than the coated particulate," and "allowing the density reducing material to adhere to a surface of the coated particulate to create at least one reduced-density, coated particulate" as recited by independent claims 35 and 68.

Moreover, *McDaniel* fails to render obvious that which *Murphey '390* lacks. Rather, the Examiner merely relies on *McDaniel* for its alleged teaching of "a composite particle comprising a low density filler material (such as ground walnut shells) and a higher density filler material (such as finely divided silica) bound by a suitable binder . . . such that the composite particle has the desired low density in a subterranean treating composition . . . ." *1-14-2009 Office Action* at 11. Applicants note that as described in *McDaniel*, a composite particle has a filler material bound by a suitable organic or inorganic binder. See *McDaniel* at [0053]. Thus a composite particle comprises a continuous phase, which is the binder, and a particulate phase, which is the filler. The particles of the present invention comprise one particle adhered to another particle and are therefore distinct from the composite particles of *McDaniel*. Since *McDaniel* is

directed to a different type of particle, it is not surprising that *McDaniel* does not disclose "at least one density reducing material, wherein the density reducing material is a solid material with a size that is greater than about half the size of the coated particulate and has a specific gravity less than the coated particulate," and "allowing the density reducing material to adhere to a surface of the coated particulate to create at least one reduced-density, coated particulate" as recited by independent claims 35 and 68.

Sielcken fails to render obvious that which *Murphey '390* and *McDaniel* lack. Rather, the Final Office Action merely relies on *Sielcken* for its alleged teaching of "a continuous process [that] can be carried out using a stirred tank reactor (CSTR), a tubular reactor, a non-stirred bubble column and an internal or external gas-lift loop reactor . . . ." *6-5-2009 Final Office Action* at 5. As such, *Sielcken* fails to teach or suggest "at least one density reducing material, wherein the density reducing material is a solid material with a size that is greater than about half the size of the coated particulate and has a specific gravity less than the coated particulate," and "allowing the density reducing material to adhere to a surface of the coated particulate to create at least one reduced-density, coated particulate" as recited by independent claims 35 and 68.

Claims 36, 42, 45, 46, 48, 49, 69-70, 72, 73, 75, and 76 depend, directly or indirectly, from independent claims 35 and 68 and therefore include all of the limitations of those independent claim. Thus, claims 35, 36, 42, 45, 46, 48, 49, 68-70, 72, 73, 75 and 76 are patentable over the combination of *Murphey '390*, *McDaniel*, and *Sielcken*. *See* 35 U.S.C. § 112 ¶ 4. Accordingly, for at least these reasons, Appellant respectfully requests that the rejection of claims 35, 36, 42, 45, 46, 48, 49, 68-70, 72, 73, 75 and 76 be withdrawn.

H. Rejection of Claims 43 and 74 Under 35 U.S.C. § 103(a) over *Murphey '390* in view of *McDaniel*, *Sielcken*, and *Murphey '988*

Claims 43 and 74 stand rejected under 35 U.S.C. § 103(a) as being unpatentable over *Murphey '390* in view of *McDaniel*, further in view of *Sielcken*, and further in view of *Murphey '988*. In order for a reference or combination of references to form the basis for a *prima facie* rejection under § 103(a), the reference or combination of references must establish that every limitation of the claim was known in the prior art. As

discussed above in Section II.G, the combination of *Murphey '390*, *McDaniel*, and *Sielcken* fails to teach or suggest "at least one density reducing material, wherein the density reducing material is a solid material with a size that is greater than about half the size of the coated particulate and has a specific gravity less than the coated particulate," and "allowing the density reducing material to adhere to a surface of the coated particulate to create at least one reduced-density, coated particulate" as recited by independent claims 35 and 68.

Murphey '988 fails to render obvious that which *Murphey '390*, *McDaniel*, and *Sielcken* lack. Rather, the Final Office Action merely relies on *Murphey '988* for its alleged teaching of "the use of ethylene glycol butyl ether . . .as a solvent for dissolving epoxy resins . . . such as bisphenol A-epichlorohydrin" *1-14-2009 Office Action* at 13. As such, *Murphey '988* fails to teach or suggest "at least one density reducing material, wherein the density reducing material is a solid material with a size that is greater than about half the size of the coated particulate and has a specific gravity less than the coated particulate," and "allowing the density reducing material to adhere to a surface of the coated particulate to create at least one reduced-density, coated particulate" as recited by independent claims 35 and 68.

Claims 43 and 74 depend, directly or indirectly, from independent claims 35 and 68 and therefore include all of the limitations of those independent claims. Thus, claims 43 and 74 are patentable over the combination of *Murphey '390*, *McDaniel*, *Sielcken*, and *Murphey '988*. *See* 35 U.S.C. § 112 ¶ 4. Accordingly, for at least these reasons, Appellant respectfully requests that the rejection of claims 43 and 74 be withdrawn.

I. Rejection of Claims 18, 19, 25, 28, 29, 31, 32, 71, and 77 Under 35 U.S.C. § 103(a) over *Murphey '390* in view of *McDaniel*, *Sielcken*, and *Martin*

Claims 18, 19, 25, 28, 29, 31, 32, 71, and 77 stand rejected under 35 U.S.C. § 103(a) as being unpatentable over *Murphey '390* in view of *McDaniel*, further in view of *Sielcken*, and further in view of *Martin*. In order for a reference or combination of references to form the basis for a *prima facie* rejection under § 103(a), the reference or combination of references must establish that every limitation of the claim was known in the prior art. As discussed above in Section II.G, the combination of *Murphey '390*, *McDaniel*, and *Sielcken* fails to teach or suggest "at least one density reducing material,

wherein the density reducing material is a solid material with a size that is greater than about half the size of the coated particulate and has a specific gravity less than the coated particulate," and "allowing the density reducing material to adhere to a surface of the coated particulate to create at least one reduced-density, coated particulate" as recited by independent claims 35 and 68.

Martin fails to render obvious that which *Murphey '390*, *McDaniel*, and *Sielcken* lack. Rather, the Final Office Action merely relies on *Martin* for its alleged teaching of "a combination of first and second particles having a density within the range of about 0.7 to about 4.0 . . ., wherein first particles has a density selected from the lower portion of the density range such as sand . . . may be used in a servicing fluid for gravel packing of subterranean well." *1-14-2009 Office Action* at 14. *Martin* does not teach a coated particulate, any coating techniques, or adhering one particle to another. As such, *Martin* fails to teach or suggest "at least one density reducing material, wherein the density reducing material is a solid material with a size that is greater than about half the size of the coated particulate and has a specific gravity less than the coated particulate," and "allowing the density reducing material to adhere to a surface of the coated particulate to create at least one reduced-density, coated particulate" as recited by independent claims 18, 35, and 68.

Claims 19, 25, 28, 29, 31, 32, 71, and 77 depend, directly or indirectly, from independent claims 18, 35, and 68 and therefore include all of the limitations of those independent claims. Thus, claims 18, 19, 25, 28, 29, 31, 32, 71, and 77 are patentable over the combination of *Murphey '390*, *McDaniel*, *Sielcken*, and *Martin*. *See* 35 U.S.C. § 112 ¶ 4. Accordingly, for at least these reasons, Appellant respectfully requests that the rejection of claims 18, 19, 25, 28, 29, 31, 32, 71, and 77 be withdrawn.

J. Rejection of Claim 26 Under 35 U.S.C. § 103(a) over *Murphey '390* in view of *McDaniel*, *Sielcken*, *Martin*, and *Murphey '988*

Claim 26 stands rejected under 35 U.S.C. § 103(a) as being unpatentable over *Murphey '390* in view of *McDaniel*, further in view of *Sielcken*, further in view of *Martin*, and further in view of *Murphey '988*. In order for a reference or combination of references to form the basis for a *prima facie* rejection under § 103(a), the reference or combination of references must establish that every limitation of the claim was known in

the prior art. As discussed above in Section II.I, the combination of *Murphey '390*, *McDaniel*, *Sielcken*, and *Martin* fails to teach or suggest "at least one density reducing material, wherein the density reducing material is a solid material with a size that is greater than about half the size of the coated particulate and has a specific gravity less than the coated particulate," and "allowing the density reducing material to adhere to a surface of the coated particulate to create at least one reduced-density, coated particulate" as recited by independent claim 18.

Murphey '988 fails to render obvious that which *Murphey '390*, *McDaniel*, *Sielcken*, and *Martin* lack. Rather, the Final Office Action merely relies on *Murphey '988* for its alleged teaching of "the use of ethylene glycol butyl ether . . . as a solvent for dissolving epoxy resins . . . such as bisphenol A-epichlorohydrin." *1-14-2009 Office Action* at 14. *Murphey '988* does not teach adhering one particle to another. Specifically, *Murphey '988* teaches that the particles are not adhered to one another, but rather are "introduced into a subterranean formation to fill at least a portion of the voids that may be present in the formation, compacted and allowed to set to provide the permeable fill material." *Murphey '988* Abstract. As such, *Murphey '988* fails to teach or suggest "at least one density reducing material, wherein the density reducing material is a solid material with a size that is greater than about half the size of the coated particulate and has a specific gravity less than the coated particulate," and "allowing the density reducing material to adhere to a surface of the coated particulate to create at least one reduced-density, coated particulate" as recited by independent claim 18.

Claim 26 depends indirectly from independent claim 18 and therefore includes all of the limitations of that independent claim. Thus, claims 26 is patentable over the combination of *Murphey '390*, *McDaniel*, *Sielcken*, *Martin*, and *Murphey '988*. *See* 35 U.S.C. § 112 ¶ 4. Accordingly, for at least these reasons, Appellant respectfully requests that the rejection of claim 26 be withdrawn.

III. Request for Evidentiary Support

Once again, should any of the above asserted rejections be maintained, Applicants respectfully request appropriate evidentiary support. Additionally, if the Examiner is relying upon "common knowledge" or "well known" principles to establish the rejection, Applicants request that a reference be provided in support of this position

pursuant to MPEP § 2144.03. Furthermore, to the extent that the Examiner maintains any rejection based on an "Official Notice" or other information within the Examiner's personal knowledge, Applicants respectfully request that the Examiner cite a reference as documentary evidence in support of this position or provide an affidavit in accordance with MPEP § 2144.03 and 37 CFR 1.104(d)(2).

IV. No Waiver

All of Applicants' arguments and amendments are without prejudice or disclaimer. Additionally, Applicants have merely discussed example distinctions from the cited references. Other distinctions may exist, and Applicants reserve the right to discuss these additional distinctions in a later Response or on Appeal, if appropriate. By not responding to additional statements made by the Examiner, Applicants do not acquiesce to the Examiner's additional statements, such as, for example, any statements relating to what would be obvious to a person of ordinary skill in the art.

SUMMARY

In light of the above amendments and remarks, Applicants respectfully request reconsideration and withdrawal of the outstanding rejections. Applicants further submit that the application is now in condition for allowance, and earnestly solicit timely notice of the same. Should the Examiner have any questions, comments or suggestions in furtherance of the prosecution of this application, the Examiner is invited to contact the attorney of record by telephone, facsimile, or electronic mail.

Applicants hereby petition for a one-month extension of time to file this response under 37 CFR § 1.136(a), extending the deadline from March 17, 2010 to April 17, 2010. Accordingly, Applicants have authorized via the Office's electronic filing system the Commissioner to debit the Deposit Account of McDermott Will & Emery, Deposit Account No. 500417, Order Number 086108-0157, in the amount of $130.00 under 37 CFR § 1.17(a)(1) for the one-month extension of time.

Applicants believe that no additional fees are due in association with the filing of this response. Should the Commissioner deem that any additional fees are due, including any fees for extensions of time, Applicants respectfully request that the Commissioner accept this as a Petition Therefore, and direct that any additional fees be

charged to McDermott Will & Emery's Deposit Account No. 500417, Order Number 086108-0157.

Respectfully submitted,

/Iona N. Kaiser/

Iona N. Kaiser
Reg. No. 53,086
McDermott Will & Emery
1000 Louisiana, Suite 3900
Houston, TX 77002-5005
Telephone: 713.653.1724
Facsimile: 713.739.7592
Email: ikaiser@mwe.com

Date: April 19, 2010